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Sequence Listing was accepted.
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217-9197 (toll free).
Reviewer: Durreshwar Anjum
Timestamp: [year=2009; month=8; day=11; hr=11; min=0; sec=6; ms=25; ]
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Application No: 10511362   Version No: 2.0

Input Set:

Output Set:

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Finished: 2009-07-24 19:16:16.363
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         Blackshear, Perry J.
         Zeldin, Darryl C.
         Graves, Joan P.
         Stumpo, Deborah J.

<120>   COMPOSITIONS AND METHODS FOR DIAGNOSTICS AND THERAPEUTICS FOR
         HYDORCEPHALUS

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<150>   60/374,184
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aaa cgt tat tcc agc cac aca tct ctg ggg aat gtt tct aat gat gaa   261
Lys Arg Tyr Ser Ser His Thr Ser Leu Gly Asn Val Ser Asn Asp Glu
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gct act ctg caa tgg ctg gag gag aac tat gag att gca gag ggg gtc          357
Ala Thr Leu Gln Trp Leu Glu Glu Asn Tyr Glu Ile Ala Glu Gly Val
        70                  75                  80

tgc atc cct cgc agt gcc ctc tat atg cat tac ctg gat ttc tgc gag          405
Cys Ile Pro Arg Ser Ala Leu Tyr Met His Tyr Leu Asp Phe Cys Glu
85                  90                  95                  100

aag aat gat acc caa cct gtc aat gct gcc agc ttt gga aag atc ata          453
Lys Asn Asp Thr Gln Pro Val Asn Ala Ala Ser Phe Gly Lys Ile Ile
                105                 110                 115

agg cag cag ttt cct cag tta acc acc aga aga ctc ggg acc cga gga          501
Arg Gln Gln Phe Pro Gln Leu Thr Thr Arg Arg Leu Gly Thr Arg Gly
                120                 125                 130

cag tca aag tac cat tac tat ggc att gca gtg aaa gaa agc tcc caa          549
Gln Ser Lys Tyr His Tyr Tyr Gly Ile Ala Val Lys Glu Ser Ser Gln
        135                 140                 145

tat tat gat gtg atg tat tcc aag aaa gga gct gcc tgg gtg agt gag          597
Tyr Tyr Asp Val Met Tyr Ser Lys Lys Gly Ala Ala Trp Val Ser Glu
        150                 155                 160

acg ggc aag aaa gaa gtg agc aaa cag aca gtg gca tat tca ccc cgg          645
Thr Gly Lys Lys Glu Val Ser Lys Gln Thr Val Ala Tyr Ser Pro Arg
165                 170                 175                 180

tcc aaa ctc gga aca ctg ctg cca gaa ttt ccc aat gtc aaa gat cta          693
Ser Lys Leu Gly Thr Leu Leu Pro Glu Phe Pro Asn Val Lys Asp Leu
                185                 190                 195

aat ctg cca gcc agc ctg cct gag gag aag gtt tct acc ttt att atg          741
Asn Leu Pro Ala Ser Leu Pro Glu Glu Lys Val Ser Thr Phe Ile Met
                200                 205                 210

atg tac aga aca cac tgt cag aga ata ctg gac act gta ata aga gcc          789
Met Tyr Arg Thr His Cys Gln Arg Ile Leu Asp Thr Val Ile Arg Ala
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aac ttt gat gag gtt caa agt ttc ctt ctg cac ttt tgg caa gga atg          837
Asn Phe Asp Glu Val Gln Ser Phe Leu Leu His Phe Trp Gln Gly Met
        230                 235                 240

ccg ccc cac atg ctg cct gtg ctg ggc tcc tcc acg gtg gtg aac att          885
Pro Pro His Met Leu Pro Val Leu Gly Ser Ser Thr Val Val Asn Ile
245                 250                 255                 260

gtc ggc gtg tgt gac tcc atc ctc tac aaa gct atc tcc ggg gtg ctg          933
Val Gly Val Cys Asp Ser Ile Leu Tyr Lys Ala Ile Ser Gly Val Leu
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atg ccc act gtg ctg cag gca tta cct gac agc tta act cag gtg att          981
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cga aag ttt gcc aag caa ctg gat gag tgg cta aaa gtg gct ctc cac        1029
Arg Lys Phe Ala Lys Gln Leu Asp Glu Trp Leu Lys Val Ala Leu His
        295                 300                 305


gac ctc cca gaa aac ttg cga aac atc aag ttc gaa ttg tcg aga agg        1077
Asp Leu Pro Glu Asn Leu Arg Asn Ile Lys Phe Glu Leu Ser Arg Arg
        310                 315                 320


ttc tcc caa att ctg aga cgg caa aca tca cta aat cat ctc tgc cag        1125
Phe Ser Gln Ile Leu Arg Arg Gln Thr Ser Leu Asn His Leu Cys Gln
325                 330                 335                 340


gca tct cga aca gtg atc cac agt gca gac atc acg ttc caa atg ctg        1173
Ala Ser Arg Thr Val Ile His Ser Ala Asp Ile Thr Phe Gln Met Leu
                345                 350                 355


gaa gac tgg agg aac gtg gac ctg aac agc atc acc aag caa acc ctt        1221
Glu Asp Trp Arg Asn Val Asp Leu Asn Ser Ile Thr Lys Gln Thr Leu
                360                 365                 370


tac acc atg gaa gac tct cgc gat gag cac cgg aaa ctc atc acc caa        1269
Tyr Thr Met Glu Asp Ser Arg Asp Glu His Arg Lys Leu Ile Thr Gln
        375                 380                 385


tta tat cag gag ttt gac cat ctc ttg gag gag cag tct ccc atc gag        1317
Leu Tyr Gln Glu Phe Asp His Leu Leu Glu Glu Gln Ser Pro Ile Glu
        390                 395                 400


tcc tac att gag tgg ctg gat acc atg gtt gac cgc tgt gtt gtg aag        1365
Ser Tyr Ile Glu Trp Leu Asp Thr Met Val Asp Arg Cys Val Val Lys
405                 410                 415                 420


gtg gct gcc aag aga caa ggg tcc ttg aag aaa gtg gcc cag cag ttc        1413
Val Ala Ala Lys Arg Gln Gly Ser Leu Lys Lys Val Ala Gln Gln Phe
                425                 430                 435


ctc ttg atg tgg tcc tgt ttc ggc aca agg gtg atc cgg gac atg acc        1461
Leu Leu Met Trp Ser Cys Phe Gly Thr Arg Val Ile Arg Asp Met Thr
                440                 445                 450


ttg cac agc gcc ccc agc ttc ggg tct ttt cac cta att cac tta atg        1509
Leu His Ser Ala Pro Ser Phe Gly Ser Phe His Leu Ile His Leu Met
                455                 460                 465


ttt gat gac tac gtg ctc tac ctg tta gaa tct ctg cac tgt cag gag        1557
Phe Asp Asp Tyr Val Leu Tyr Leu Leu Glu Ser Leu His Cys Gln Glu
        470                 475                 480


cgg gcc aat gag ctc atg cga gcc atg aag gga gaa gga agc act gca        1605
Arg Ala Asn Glu Leu Met Arg Ala Met Lys Gly Glu Gly Ser Thr Ala
485                 490                 495                 500


gaa gtc cga gaa gag atc atc ttg aca gag gct gcc gca cca acc cct        1653
Glu Val Arg Glu Glu Ile Ile Leu Thr Glu Ala Ala Ala Pro Thr Pro
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tca cca gtg cca tcg ttt tct cca gca aaa tct gcc aca tct gtg gaa   1701
Ser Pro Val Pro Ser Phe Ser Pro Ala Lys Ser Ala Thr Ser Val Glu
        520   525   530

gtg cca cct ccc tct tcc cct gtt agc aat cct tcc cct gag tac act   1749
Val Pro Pro Pro Ser Ser Pro Val Ser Asn Pro Ser Pro Glu Tyr Thr
        535   540   545

ggc ctc agc act aca ggt aat gga aag tcc ttc aaa aac ttt ggg tag   1797
Gly Leu Ser Thr Thr Gly Asn Gly Lys Ser Phe Lys Asn Phe Gly
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cacacacaaa aagccagaca tcttggctca cacctgtagt cccagctact tgggaggctg   1917

aggtgggaga attgcttgag cccaggagct acgatcgcac cactgcattc tagccttagt   1977

gatacagtga gaccttgtct caaaaaaaga aaaacagggc tttctggaaa aacattcttc   2037

tcccacaatc tccaaaagat aatgccaaaa cctgggtatc ttcctggatt tgtgaatgac   2097

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        35   40   45

Ser Asn Asp Glu Asn Glu Glu Lys Glu Asn Asn Arg Ala Ser Lys Pro
    50   55   60

His Ser Thr Pro Ala Thr Leu Gln Trp Leu Glu Glu Asn Tyr Glu Ile
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Ala Glu Gly Val Cys Ile Pro Arg Ser Ala Leu Tyr Met His Tyr Leu

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                85                      90                      95


Asp Phe Cys Glu Lys Asn Asp Thr Gln Pro Val Asn Ala Ala Ser Phe
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Gly Lys Ile Ile Arg Gln Gln Phe Pro Gln Leu Thr Thr Arg Arg Leu
            115                     120             125


Gly Thr Arg Gly Gln Ser Lys Tyr His Tyr Tyr Gly Ile Ala Val Lys
            130                 135             140


Glu Ser Ser Gln Tyr Tyr Asp Val Met Tyr Ser Lys Lys Gly Ala Ala
145                     150             155                 160


Trp Val Ser Glu Thr Gly Lys Lys Glu Val Ser Lys Gln Thr Val Ala
                165                 170             175


Tyr Ser Pro Arg Ser Lys Leu Gly Thr Leu Leu Pro Glu Phe Pro Asn
            180                 185             190


Val Lys Asp Leu Asn Leu Pro Ala Ser Leu Pro Glu Glu Lys Val Ser
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Thr Phe Ile Met Met Tyr Arg Thr His Cys Gln Arg Ile Leu Asp Thr
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Val Ile Arg Ala Asn Phe Asp Glu Val Gln Ser Phe Leu Leu His Phe
225                 230             235                 240


Trp Gln Gly Met Pro Pro His Met Leu Pro Val Leu Gly Ser Ser Thr
                245                 250             255


Val Val Asn Ile Val Gly Val Cys Asp Ser Ile Leu Tyr Lys Ala Ile
            260                 265             270


Ser Gly Val Leu Met Pro Thr Val Leu Gln Ala Leu Pro Asp Ser Leu
        275                 280             285


Thr Gln Val Ile Arg Lys Phe Ala Lys Gln Leu Asp Glu Trp Leu Lys
        290                 295             300


Val Ala Leu His Asp Leu Pro Glu Asn Leu Arg Asn Ile Lys Phe Glu
305                 310             315                 320
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Leu Ser Arg Arg Phe Ser Gln Ile Leu Arg Arg Gln Thr Ser Leu Asn
          325   330   335

His Leu Cys Gln Ala Ser Arg Thr Val Ile His Ser Ala Asp Ile Thr
          340   345   350

Phe Gln Met Leu Glu Asp Trp Arg Asn Val Asp Leu Asn Ser Ile Thr
          355   360   365

Lys Gln Thr Leu Tyr Thr Met Glu Asp Ser Arg Asp Glu His Arg Lys
     370   375   380

Leu Ile Thr Gln Leu Tyr Gln Glu Phe Asp His Leu Leu Glu Glu Gln
385   390   395   400

Ser Pro Ile Glu Ser Tyr Ile Glu Trp Leu Asp Thr Met Val Asp Arg
               405   410   415

Cys Val Val Lys Val Ala Ala Lys Arg Gln Gly Ser Leu Lys Lys Val
          420   425   430

Ala Gln Gln Phe Leu Leu Met Trp Ser Cys Phe Gly Thr Arg Val Ile
          435   440   445

Arg Asp Met Thr Leu His Ser Ala Pro Ser Phe Gly Ser Phe His Leu
     450   455   460

Ile His Leu Met Phe Asp Asp Tyr Val Leu Tyr Leu Leu Glu Ser Leu
465   470   475   480

His Cys Gln Glu Arg Ala Asn Glu Leu Met Arg Ala Met Lys Gly Glu
               485   490   495

Gly Ser Thr Ala Glu Val Arg Glu Glu Ile Ile Leu Thr Glu Ala Ala
          500   505   510

Ala Pro Thr Pro Ser Pro Val Pro Ser Phe Ser Pro Ala Lys Ser Ala
          515   520   525

Thr Ser Val Glu Val Pro Pro Pro Ser Ser Pro Val Ser Asn Pro Ser
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Asn Phe Gly



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                                                        Met Asn Trp
                                                         1


gct gcc ttc gga ggg tct gaa ttc ttc atc cca gaa ggc att cag ata       166
Ala Ala Phe Gly Gly Ser Glu Phe Phe Ile Pro Glu Gly Ile Gln Ile
      5               10              15


gat tcg aga tgc cca cta agc aga aat atc acg gaa tgg tac cat tac       214
Asp Ser Arg Cys Pro Leu Ser Arg Asn Ile Thr Glu Trp Tyr His Tyr
 20              25              30              35


tat ggc att gca gtg aaa gaa agc tcc caa tat tat gat gtg atg tat       262
Tyr Gly Ile Ala Val Lys Glu Ser Ser Gln Tyr Tyr Asp Val Met Tyr
             40              45              50


tcc aag aaa gga gct gcc tgg gtg agt gag acg ggc aag aaa gaa gtg       310
Ser Lys Lys Gly Ala Ala Trp Val Ser Glu Thr Gly Lys Lys Glu Val
         55              60              65


agc aaa cag aca gtg gca tat tca ccc cgg tcc aaa ctc gga aca ctg       358
Ser Lys Gln Thr Val Ala Tyr Ser Pro Arg Ser Lys Leu Gly Thr Leu
     70              75              80


ctg cca gaa ttt ccc aat gtc aaa gat cta aat ctg cca gcc agc ctg       406
Leu Pro Glu Phe Pro Asn Val Lys Asp Leu Asn Leu Pro Ala Ser Leu
      85              90              95


cct gag gag aag gtt tct acc ttt att atg atg tac aga aca cac tgt       454
Pro Glu Glu Lys Val Ser Thr Phe Ile Met Met Tyr Arg Thr His Cys
100             105             110             115


cag aga ata ctg gac act gta ata aga gcc aac ttt gat gag gtt caa       502
Gln Arg Ile Leu Asp Thr Val Ile Arg Ala Asn Phe Asp Glu Val Gln
             120             125             130
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gtg ctg ggc tcc tcc acg gtg gtg aac att gtc ggc gtg tgt gac tcc          598
Val Leu Gly Ser Ser Thr Val Val Asn Ile Val Gly Val Cys Asp Ser
            150                 155                 160

atc ctc tac aaa gct atc tcc ggg gtg ctg atg ccc act gtg ctg cag          646
Ile Leu Tyr Lys Ala Ile Ser Gly Val Leu Met Pro Thr Val Leu Gln
            165                 170                 175

gca tta cct gac agc tta act cag gtg att cga aag ttt gcc aag caa          694
Ala Leu Pro Asp Ser Leu Thr Gln Val Ile Arg Lys Phe Ala Lys Gln
180                 185                 190                 195

ctg gat gag tgg cta aaa gtg gct ctc cac gac ctc cca gaa aac ttg          742
Leu Asp Glu Trp Leu Lys Val Ala Leu His Asp Leu Pro Glu Asn Leu
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cga aac atc aag ttc gaa ttg tcg aga agg ttc tcc caa att ctg aga          790
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